

NOVEMBER/DECEMBER 2025

**23UCA52 — DATABASE MANAGEMENT
SYSTEM**

Time : Three hours

Maximum : 75 marks

SECTION A — (10 × 2 = 20 marks)

Answer ALL questions.

1. Compare Data versus Information.
2. Name the types of Databases.
3. Define the term Entity Set.
4. Why indexing is important?
5. State the table modification commands in SQL.
6. What is a Partial Dependency? With what normal form is it associated?
7. Give an example to create a View.
8. What is a Sub Query? Write its basic Characteristics.
9. Name three sections of the PL/SQL block.
10. How do you add Comments in PL/SQL?



SECTION B — (5 × 5 = 25 marks)

Answer ALL questions.

11. (a) Explain the business rules and how they influence Database Design.

Or

- (b) How data models can be classified by their Level of Abstraction? Explain it.

12. (a) Explain the basic components of Relational Database Models.

Or

- (b) Draw the ER Diagram for Banking Systems applications.

13. (a) How normal forms can be transformed from Lower Normal forms to Higher Normal forms.

Or

- (b) Exemplify the Data Manipulation Commands.

14. (a) Examine the Cross Join, Natural Join and Outer Join Operations in SQL.

Or

- (b) Explicate the importance of various SQL Functions.

15. (a) Write a brief history of PL/SQL.

Or

- (b) Briefly describe the significance of Implicit and Explicit Cursors.

SECTION C — (3 × 10 = 30 marks)

Answer any THREE questions.

16. Narrate about the Evolution of Data Models.

17. Exemplify the relational database Operators, the Data Dictionary, and the System Catalog.

18. With suitable example, explain any two types of Normalization.

19. Identify and explain the Relational Set Operators in advanced SQL.

20. Illustrate the different Selection statements available in PL/SQL.